

SPORTS

SARAJEVO WINTER OLYMPICS

'GOLD' DEBUT

FOR MUSCOVITE

21-year-old Sergei Fokichev, from Moscow, has won the 500 m speedskating event in a striking debut showing at Sarajevo.

It is quite rare for a skater running in the first pair to win, said five-time Olympic champion American Eric Heiden, who is covering the Olympics for ABC. This July he will be graduating from Stanford University biology department, he continued. They often ask me whether I am planning to enter for the cycling events at the 1984 Summer Games. The answer is no—cycling is just a hobby for me.

Incidentally, in the run-up to the 500 m event, Heiden named Japanese Akira Kuroiwa as a good bet to win the title, and was proved wrong.

24-year-old Dresden college student Christa Rothenburger, a world record holder, won the women's 500 m speedskating in 41.02—just 0.26 sec ahead of her teammate and already twice Olympic champion Karin Enke. Natalya Shive, of the USSR, took the bronze.



Sergei Danilin, the silver prize-winner in luge. ● The 30 km men's skiing winners (from left): Alexander Zavyalov (USSR, 2nd place), Nikolai Zimyatov (USSR, 1st place) and Gunde Swann (Sweden, 3rd place).

WINNING IT THE HARD WAY

The course was a most taxing one, and the weather surely did not make things easier. The closing kilometre was particularly trying for me, Nikolai Zimyatov, from the Moscow Region, told a TASS correspondent right after finishing first in the Olympic 30 km cross-country skiing race.

The 28-year-old ace thus joins the ranks of the select few who

have triumphed in two successive Winter Olympics. To his three golds in Lake Placid, Zimyatov has added a Sarajevo title for an event in which he established an unsailable lead right from the start.

At the beginning of the season Zimyatov was still largely unknown quantity, as he had been continually plagued by injury and ill health ever since the 1980 world championship at Holmenkollen only managing to register a few top ten finishes in the season.

Now four-time Olympic champion, the 180 cm and 68 kg Zimyatov went through the winter unaffected by the cold, which has been peaking ever since childhood. He added this by swimming outdoors from early spring till late in the autumn.

Like most leading Soviet skiers, he was raised in the countryside. In the Runyantsyev settlement outside Moscow, his mother is a teacher and his father a skilled glass-blower. Zimyatov, who graduated from the Physical Training Institute, is now doing his military service.

LENINGRAD PAIR LIVE UP TO EXPECTATIONS

Yelena Valova and Oleg Vasiliev of the USSR have won the gold for the Olympic figure-skating pairs adding to the European and world titles.

Both students at the Leningrad Physical Training Institute (Yelena is 21 and Oleg 24), they are carrying on the Olympic winning tradition of Irina Rodnina and Alexander Zaitsev.

Their teammates and Olympic discoveries, Larisa Seleznyova and Oleg Makarov, came third, behind noted American brother and sister Caitlin and Peter Carruthers.

Valova and Vasiliev opened competition in the top group and had to go all out leaving no chances for their opponents.

According to experts, among them Olympic winner Robin Cousins, of Britain, who covered the event for television, they were certainly up to the mark.

An excellent showing, I was most impressed by their skating style—a fine balance between technical complexity, artistic merit and emotional charge, he emphasized.

Determination rewarded

I guess the Soviet luge's finest hour is still ahead of them, said Sergei Danilin, of the USSR, who won a silver in Sarajevo, while his teammate Valery Dudin placed third.

Danilin won the award the hard way. Only eight after the first run, he appeared to have no chance of making the top three—which was where he ended up.

The hardest thing for me was to get into the right mood, but I told myself there was still

some hope left and resolved to scramble for centimetres and hundredths of a second, Danilin emphasized. Many entrants simply gave away to emotions; not so with winner Paul Hildgerner, of Italy, who competed in his fourth Olympics.

The GDR made a sweep in the women's luge. Staffi Martin emerging on top, Ingrida Amanova and 1980 Olympic winner Vera Zozulya, both of the USSR, ended up fourth and fifth.

...I WONDER WHERE I LOST THOSE HUNDREDTHS OF A SECOND'

...I was really crestfallen when I learned that I had lost to Sweden's Tomas Gustafson—just a few centimetres lost me the title, said 5,000 m speedskating runner-up Igor Malkov of the USSR after the award presentation ceremony. I keep wondering just where I lost those fatal hundredths of a second, he confessed.

He was five years old when his mother, a crane operator at

the Pervouralsk pipe-making plant, joined him up in a figure-skating group. He spent one year there and then quit to join a bandy team. At 11 he and several of his mates decided to join a speedskating group at the Ural'ski Trubnik plant sports club.

That's how I started my speedskating career, and I do not regret it, said Malkov.

First time without medals

Marja-Liisa Hännäläinen of Finland has won her second Olympic title by winning the 5 km cross-country race in Grand style.

The USSR did not meet with success this time. In five previous Winter Olympics Soviet entrants won the title three times but failed to make the top ten this time.

The 20 km cross-country race, the first event of the biathlon contest, was won by 24-year-old Peter Angerer of West Germany, who braved very adverse weather conditions successfully than the rest of the field, he only made shooting misses.

The USSR's poor showing was a surprise for the experts. In the three previous Games it won the title while this time the top Soviet contender, Sergei Butygin placed a poor 17th.

An exceptionally poor shooting performance proved the Soviet entrants' ongoing comment four times Olympic winner Alexander Tikhonov.



EDITORIAL BOARD

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GDR: ONE MEDAL UP

Computer predictions prior to the Olympic ski-jump contest failed to name a strong favourite, but most experts were agreed on success for GDR's Jens Weissflog, who's been unchallenged this season. The "man without nerves" as

they have dubbed him, Weissflog proved his worth by taking the 70 m event.

He typifies the new crop of "flying skiers" relying on technical excellence rather than sheer brawn.

PODIUM

Men's 30 km cross-country skiing
1. Nikolai Zimyatov (USSR) — 1 hr 20 min 56.3 sec
2. Alexander Zavyalov (USSR) — 1:23.2.3
3. Gunde Swann (Sweden) — 1:29.35.7

Men's 500 m speedskating
1. Sergei Fokichev (USSR) — 38.10 sec
2. Yoshihito Kizazawa (Japan) — 38.30
3. Gaetan Boucher (Canada) — 38.39

Women's 500 m speedskating
1. Christa Rothenburger (GDR) — 41.02 sec
2. Karin Enke (GDR) — 41.28
3. Natalya Shive (USSR) — 41.50

Men's 5,000 m speedskating
1. Tomas Gustafson (Sweden) — 7 min 12.28 sec
2. Igor Malkov (USSR) — 7:12.30
3. Rens Schoofsch (GDR) — 7:17.49

Women's 1,000 m speedskating
1. Karin Enke (GDR) — 1 min 21.61
2. Andrea Schoene (GDR) — 1:22.83
3. Natalya Petrusyova (USSR) — 1:23.21

Nordic combined event
1. Tom Sandberg (Norway) — 422.5 points
2. Jouko Karjalainen (Finland) — 416.9
3. Jukka Ylipulli (Finland) — 410.8

Women's 5 km cross-country skiing
1. Marja-Liisa Hännäläinen (Finland) — 17 min 04.0 sec
2. Berit Aunli (Norway) — 17:14.1
3. Kvetta Jerlova (Czechoslovakia) — 17:18.3

Two-men bob race
1. GDR-II (Wolfgang Hoppe-Dietmar Schusterhammer) — 3 min 25.58 sec
2. GDR-I (Bernhard Lehmann-Bogdan Mustoj) — 3:26.04
3. USSR-II (Zinits Ekmanis-Vladimir Alexandrov) — 3:26.16

Biathlon, 20 km race
1. Peter Angerer (West Germany) — 1 hour 11 min 52.7 sec
2. Frank-Peter Rosch (GDR) — 1:13.21.4
3. Erik Kvåløyst (Norway) — 1:14.02.4

70 m ski-jump event
1. Jens Weissflog (GDR) — 215.2 points (90 and 87 m)
2. Matti Nykanen (Finland) — 214.0 (91 and 84)
3. Jari Puikkonen (Finland) — 212.8 (81.5 and 91.5)

Men's luge (four run total)
1. Paul Hildgerner (Italy) — 3 min 04.258 sec
2. Sergei Danilin (USSR) — 3 min 04.962
3. Valery Dudin (USSR) — 3:05.012

Women's luge (four run total)
1. Staffi Martin (GDR) — 2 min 46.570 sec
2. Beilina Schmidt (GDR) — 2:46.873
3. Ute Weiss (GDR) — 2:47.248

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Konstantin Chernenko receiving Indira Gandhi.

Conversation between Konstantin Chernenko and Indira Gandhi

On February 14, a meeting took place in the Kremlin between Konstantin Chernenko, General Secretary of the CPSU Central Committee, and the Prime Minister of India, Indira Gandhi. Also participated: Andrei Gromyko, Member of the Politbureau of the CPSU Central Committee, First Vice-Chairman of the USSR Council of Ministers and USSR Foreign Minister, and India's Minister of External Affairs P. V. Narasimha Rao.

The Soviet side expressed gratitude to the Prime Minister and people of friendly India for the respect they had shown to the memory of Yuri Andropov.

In the short conversation that followed the steady progressive development of Soviet-Indian relations was noted with satisfaction and the mutual desire was expressed to further strengthen

and deepen these relations on the firm basis of the Treaty of Friendship and Cooperation between the USSR and India, which reliably serves the interests of both countries, the cause of peace in Asia and throughout the world.

Others taking part in the conversation, which proceeded in a warm and friendly atmosphere, were, on the Soviet side — A. M. Alexandrov and V. V. Pribytkov — assistants to the General Secretary of the CPSU Central Committee; and the USSR Ambassador to India V. N. Rykov; on the Indian side — Indira's Ambassador to the USSR S. Nurul Hasan, C. Parthasarathi, Adviser to the Prime Minister, M. Rangit, Foreign Secretary at the Ministry of External Affairs of India and C. R. Charekhan, Joint Secretary to the Prime Minister.

Conversation between Konstantin Chernenko and Margaret Thatcher

On February 14, a meeting took place between Konstantin Chernenko, General Secretary of the CPSU Central Committee, and the British Prime Minister, Margaret Thatcher. Also participated: Andrei Gromyko, Member of the Politbureau of the CPSU Central Committee, First Vice-Chairman of the USSR Council of Ministers and USSR Foreign Minister; and Geoffrey Howe, British Secretary of State for Foreign and Commonwealth Affairs.

On behalf of the Soviet leadership Konstantin Chernenko expressed gratitude for the respect shown by the British Government and people to the memory of Yuri Andropov.

A brief exchange of views took place regarding the interna-

tional situation and bilateral Soviet-British relations.

Konstantin Chernenko pointed out that in order to change for the better the situation that has arisen in the world it is necessary not only for the USSR and its allies but also for the NATO countries, including Britain, to make efforts towards this end.

It was also indicated that were the British side to show proper readiness, bilateral relations between our countries could be more substantial.

Others taking part in the conversation were: A. M. Alexandrov and V. V. Pribytkov, assistants to the General Secretary of the CPSU Central Committee; V. I. Popov, USSR Ambassador to Britain, and Iain J. M. Sulhain, British Ambassador to the USSR.

Conversation between Konstantin Chernenko and George Bush

On February 14, Konstantin Chernenko, General Secretary of the CPSU Central Committee, received in the Kremlin George Bush, US Vice-President. Taking part in the conversation were: Andrei Gromyko, Member of the Politbureau of the CPSU Central Committee, First Vice-Chairman of the USSR Council of Ministers and USSR Foreign Minister, and Howard Baker, leader of the Republican majority in the US Senate.

On behalf of the President and the people of the United States George Bush expressed deep condolences on the death of Yuri Andropov.

The Soviet side expressed gratitude for the respect shown to the memory of Yuri Andropov.

A principled exchange of views regarding the current international situation and Soviet-American relations took place. Konstantin Chernenko reaffirmed that the Soviet Union's policy in international affairs would continue in future to be oriented towards the preven-

tion of nuclear war, towards the strengthening of peace and promotion of equal cooperation between all countries and peoples. At the same time it was stressed that the USSR wages no everything necessary to protect its security interests and those of its allies and friends.

Soviet-American relations, said Konstantin Chernenko, should be built on the basis of equality and equal security, mutual consideration for legitimate interests and non-interference in each other's internal affairs. Were the American side to show concrete willingness to adhere to these principles, it would be possible to start improving relations between the two countries.

Also present during the conversation were: A. F. Dobrynin, USSR Ambassador to the USA, A. M. Alexandrov and V. V. Pribytkov, assistants to the General Secretary of the CPSU Central Committee, and Arthur Hartman, US Ambassador to the USSR.

Conversation between Konstantin Chernenko and Pierre Trudeau

On February 15, Konstantin Chernenko, General Secretary of the CPSU Central Committee, received in the Kremlin Pierre Elliott Trudeau, Prime Minister of Canada. Also taking part in the conversation, that followed was Andrei Gromyko, Member of the Politbureau of the CPSU Central Committee, First Vice-Chairman of the USSR Council of Ministers and USSR Foreign Minister.

Konstantin Chernenko expressed to Pierre Trudeau the gratitude of the Soviet leadership for the respect displayed by the Government and people of Canada to the memory of Yuri Andropov.

Both sides expressed serious concern over the increased tension in the world. In this connection the Soviet Union and Canada confirmed their willing-

ness to make efforts to return to the road of détente, and to create and maintain confidence in relations between states.

On the Soviet side it was stressed that the USSR stands for political dialogue with all countries, to be conducted on a just and equal basis, and aimed at achieving concrete accords.

The two sides also expressed their mutual intention to use available reserves to expand and deepen bilateral relations. Other participants in the conversation were: A. M. Alexandrov and V. V. Pribytkov, assistants to the General Secretary of the CPSU Central Committee; on the Canadian side — Peter Hancock, Director-General, USSR and Eastern Europe Bureau, Department of External Affairs, and Canada's Ambassador to the USSR, Peter Roberts.

GRATITUDE FOR CONDOLENCES

The CPSU Central Committee, the Presidium of the USSR Supreme Soviet and the USSR Council of Ministers have expressed their profound gratitude to all heads of state and government and state and public figures who have shared in our grief over the passing away of Yuri Andropov.

The CPSU Central Committee, the Presidium of the USSR Supreme Soviet and the USSR Council of Ministers have expressed their heart-felt gratitude to foreign comrades and friends, to the working people of socialist countries, fraternal parties, fighters for social progress, to all who have supported our Party and country in their grievous loss.

Round the Soviet Union

● THE BUILDERS OF THE URENGOI — CENTRE-1 GAS PIPELINE HAVE STARTED LAYING THE TUNNEL UNDER THE ILET, A TRIBUTARY OF THE VOLGA. Linking two major sections of the pipeline, it will speed up construction.

● THE CONSTRUCTION HAS ENDED OF THE MAIN WATER-INTAKE FACILITY OF THE YUZ-BASH-AKSAYEVSKAYA IRRIGATION SYSTEM ON THE BANKS OF THE TEREK RIVER. Water will flow via a many kilometre-long canal to the arid lands of Northern Dagestan (an autonomous republic in the Caucasus). The canal will irrigate 10 thousand hectares of wheat crops and vineyards.

CPSU CENTRAL COMMITTEE PLENARY MEETING DOCUMENTS

Novosti Press Agency has put out a booklet containing the documents of the Extraordinary Plenary Meeting of the CPSU Central Committee held on February 13 in Moscow.

CPSU: the Policy of Peace and Constructive Endeavour Continues

Documents of the Extraordinary Plenary Meeting of the CPSU Central Committee
February 13, 1984

The booklet includes: Report on the Plenary Meeting of the Central Committee of the Communist Party of the Soviet Union; Speech by General Secretary of the CPSU Central Committee Konstantin Chernenko; Speech by Member of the Politbureau of the CPSU Central Committee, Chairman of the USSR Council of Ministers Nikolai Tikhonov; Biography of Konstantin Chernenko, General Secretary of the CPSU Central Committee; and Speech by General Secretary of the CPSU Central Committee Konstantin Chernenko at the Funeral Meeting in Red Square on February 14, 1984.

Fly, dove of peace!

According to an ancient myth, Mars, the god of war, cancelled a military campaign because a white dove made a nest in his helmet and sat on her eggs there.

Mars decided not to destroy a nest, so goes the myth, and no war broke out...

The dove is the symbol of peace. Such was the theme of a pigeon show held recently in the Ural city of Chelyabinsk. 250 pigeons of 45 breeds were represented. Children in Chelyabinsk cut pigeons out of white paper and collected several hundred signatures to an appeal under the title "Vote For Peace!"

Sergei BELKOVSKIY



INDIRA GANDHI: WE BELIEVE IN COEXISTENCE

Delhi. The Indian Prime Minister, Indira Gandhi said that the deployment of Pershing-2 and cruise missiles in Western Europe by the United States and its NATO allies has led to heightened tension in the world.

Indira Gandhi, who is Chairman of the Non-Aligned Movement, pointed out in an interview to the Polish newspaper "Trybuna Ludu" which was published here, that the non-aligned countries must play an important role in the struggle for the preservation of peace, international security, and reduction of tension and disarmament. She recalled that the non-aligned summit which was held in Delhi last year proposed an international convention to ban the use or threat of nuclear ar-

aments under any circumstances and to call a halt to the further production and deployment of such weapons.

Indira Gandhi has confirmed India's adherence to a policy of peace. Our foreign policy is the logical continuation of our national liberation movement, she said. We want to maintain and develop friendly relations with all states. We are opposed to militarism and any form of domination. We favour peaceful settlement of differences and we support the cause of cooperation in the interests of all humanity. We believe in coexistence. The world is big enough for all of us to coexist regardless of our political convictions, religion or race. Yet, it is not large enough for us to be able to survive a nuclear war.

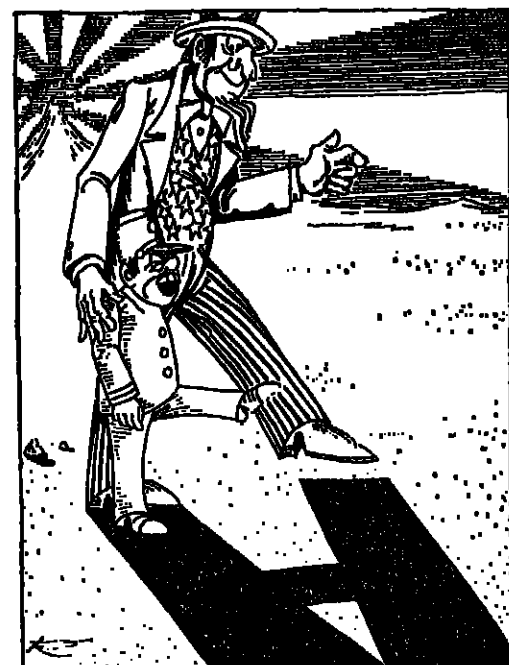
'BLACK BIRDS' OVER SWEDEN

Stockholm. According to the Swedish "Norrskenstidningen" paper, the US Black Bird supersonic jets stationed at the American air base at Malmstrom in Montana daily violate Swedish air space during overflights of the Baltic to gather intelligence on the Soviet Union, as well as Poland and the GDR.

Such overflights are an element of US and NATO espionage against the USSR, the article points out. Especially used for this purpose is the latest electronic monitoring station recently installed by NATO at the Danish Skrydstrup airfield. The Black Bird planes are equipped with the most advanced electro-

nir devices weighing over 70 tonnes for gathering intelligence on ship and troop movements, intercepting radio reports, as well as photographing vast territories from high altitudes.

The data is electronically processed aboard the planes and immediately sent across Danish territory via NATO communication channels to US spy centres, which receive round-the-clock intelligence on the Soviet Union from hundreds of other planes and spy satellites. The data is used to help develop and improve new missiles and plans to achieve military superiority for the USA, the paper points out.



Drawing by Konstantin Rybalov

APPEAL by JERRY RAWLINGS

Accra. Independent countries in Africa, Asia and Latin America must join forces in their battle to overcome consequences of centuries old colonial exploitation, says Jerry Rawlings, Chairman of the Provisional National Defence Council of Ghana.

In his speech to the participants of the international conference of solidarity with the

peoples of the south of Africa he stresses that the native African population of South Africa and the people of Namibia are oppressed by the inhuman system of apartheid and colonialism.

The Ghanaian leader called on delegates at the meeting to produce effective measures to assist the national liberation movements in the south of the continent.

The 39th session for UN General Assembly

New York. Prevention of nuclear war, curbing the arms race, a peaceful solution to all controversial international issues through constructive negotiations, and development of mutually beneficial cooperation between the countries of all continents. These are the main items on the agenda for the next, 39th session of the UN General Assembly which is to open here on September 18, 1984. The UN Secretariat has published a preliminary list of 138 items for inclusion into the agenda of the session, which usually continues for three months.

Among other things, the session will examine the freezing of nuclear arsenals, an immediate halt and ban to all test of nuclear weapons, and prevention of the arms race spilling into space.

According to the preliminary agenda, the 39th session will focus much of its attention on the settlement of crises in 'hot spots', such as the Middle East, southern Africa, and Cyprus. The delegates from 138 states will also discuss the situation in Central America, where armed interference and subversive operations carried out by the United States have led to an explosive situation. An important place in the UN debates will be devoted to the struggle for the final elimination of colonialism, and for the abolition of race discrimination and the apartheid system.

FACTS AND EVENTS

① "The Star" of Johannesburg reports the French decision to set up a large air and naval base on Mayotte Island which is part of the Comore Islands. Citing a well-informed source, the paper writes that this base in the Mozambique Channel will be the headquarters of the French armed forces stationed in the Indian Ocean region.

② The USA has started to manufacture laser weapons. According to information which has come into the possession of the "Knoxville News-Sentinel" newspaper, a laser device designed to hit flying targets has been built at a secret facility belonging to the Energy Department of Oak Ridge, Tennessee. During tests, the device, which cost 10 million dollars to build, destroyed drones.

③ The British Government continues to sell off government-owned industries. This has been confirmed yet again by the Cabinet decision to denationalize the Scott Lithgow shipyard in Scotland.



The people of Nicaragua have taken up arms to protect what they won in the Revolution. In answer to an appeal from the Sandinista National Liberation Front and the Government of National Reconstruction, tens of thousands of patriots have joined the ranks of the people's militia and are undergoing courses of intense military training. In the photo: a group of peasant volunteers from a cooperative in the south of the country.

Science and technology

A FAIL-SAFE ELEVATOR

Many people died during fires in multistorey houses because they could not get out of a jammed elevator. The difficulty is that the existing security systems block it between the floors when the cable becomes heated or when there are faults in the electrical network.

French designers tried to solve the problem of evacuating people quickly from a lift which has stopped suddenly. The emergency system they worked out is switched on at the exact moment when electrical energy is switched off. The cabin of the elevator is automatically removed from the supporting frame and with a spring mechanism frees itself from the cable and under the impact of its own weight descends on brakes.

ELECTRONIC WATCHMAN

American inventors are still wracking their brains over better and more reliable locks and warning systems which can ward off the most determined thieves. The latest invention is a microcomputer which is built into an electronic system, such as a stereo or car radio. Only the owner of the object, who knows the code, can play his record, the code or radio once the electricity has been disconnected. To the thief who steals a radio fitted with this sophisticated lock, the radio will remain mute. "Newsweek" magazine believes that new products labeled as having an electronic lock will make potential thieves wary of stealing them.

'ENORMOUS PROVOCATION'

In the Democratic People's Republic of Korea, the army has been put on full alert, and the population has been urged to exercise the utmost vigilance.

A new wave of mass anti-war demonstrations has swept Japan. In both cases, these actions are a response to the American-South Korean military manoeuvres, Team Spirit-84, which have begun in the area.

The scale and the objectives of the operation point to the particularly dangerous nature of the exercises. From both sides, they involve more than 200 thousand servicemen, ships of the Seventh American Fleet, units of the American Air Force stationed on the Japanese Islands, Okinawa and on the Island of Guam. Also taking part in the manoeuvres are representatives from the Japanese "self-defence" forces. Japan itself has been converted into a logistic support base for the exercises.

A spokesman for the joint American-South Korean command said that the exercises

U.S. servicemen proving a headache

Tokyo. Almost 350 serious crimes were committed last year by American servicemen stationed on the Japanese Islands. This was reported by the chief of the Japanese police administration. But in the opinion of Japan's democratic organizations, the number of crimes committed by the US soldiers is well above the figure quoted in the official reports.

According to a special provision in the so-called Japanese-US "Treaty on Security", Japanese bodies of justice are limited as to their powers to summon US servicemen to courts of law. So the wrongdoers in US uniforms hide from justice behind the gates of US military bases, enjoying the right to extrajudicial immunity. Hideo Fukuyama, a leader of the Japanese Peace Committee, says that under these circumstances, the "Treaty on Security" certainly does not guarantee "security" to the Japanese citizens.

OF INTEREST

Imitating Cheops

A small village in the south of France would never attract tourists if it were not for the local postman Joseph-Ferdinand Chevalier. It turned out that he spent 50 years building his future burial tomb. He patiently collected unusually-shaped boulders, ordered marble slates, and decorated the tomb with ceramics, columns, sculptures, lanterns, small towers and carved cornices. Either the rural postman aspired to the glory of Cheops who built the mammoth pyramid or he was possessed by other vain aspirations, but

for the sake of completing his mausoleum he saved every odd centime. When he died at the age of 76 his kin, notified by his fragility, buried him in an ordinary grave in an ordinary cemetery. But what of the glorious tomb? It is now a tourist attraction.

Mr Roberts is postman in a town with the longest name in Britain. With 58 letters the name of the town is difficult not only to pronounce, but also to write. That is why Roberts sometimes has to deliver rather unusually long parcels.

Photo UPI-TASS

FROM THE SOVIET PRESS

EUROPEANS AS ALLIES TO SAVE DETENTE

Europe must take advantage of the historical chance it now has to maintain detente while it can before the atmosphere of confrontation and militarism built up by Washington envelops the world in a new "cold war", writes V. Lomelko in the INTERNATIONAL AFFAIRS magazine. Far from opposing Europe to other regions, one should, nevertheless, realize that, apart from objective necessity, there exist objective possibilities for increasing security and confidence on the continent.

The Europeans have a vital interest in policies of detente being maintained, regardless of whether they live in West or East, or of their political, ideological and other convictions. Should we shift onto the rails of "anti-detente" against a background of further escalation in nuclear armaments, we will be letting ourselves in for a "lighting war". Realization of this simple truth turns all sober-minded Europeans into allies in the defence of policies of peace. This does not mean that Europe has no opponents of detente. They are, however, in an obvious minority on the one hand, and on the other even they are not at all anxious to see a so-called "limited" war fought on their continent.

THE LIES AND THE TRUTH ABOUT LEBANON

A mountain of duplicity and lies—is how IZVESTIA observer Konstantin Galvandov describes Reagan's remarks in his interview to "The Wall Street Journal" when he said that NATO's multinational force whose backbone are the American Marines was intended to act as a stabilizing factor until Lebanon could stand on its own legs. One can gain an idea of just what this means from the results of the present activities of the American military and their allies on Lebanese soil. The interethnic strife which they have provoked with renewed intensity has brought the country to the brink of full-scale civil war. The American troops openly interfered in the severe clashes in Beirut and its suburbs taking the side of one party to the conflict. Tanks, Marine howitzers, dock artillery and planes from the American Sixth Fleet ships bombarded the positions of the national patriotic forces of Lebanon with shells and bombs without a thought for the civilian population, schools, churches or mosques.

DANGEROUS PLANS

The murder of an Indian diplomat in Britain by Kashmiri terrorists has aroused profound indignation in India, writes Valentin Korotkov, PRAVDA's correspondent in Delhi.

Acts of terrorism and sabotage, bank robberies, and all manner of disturbances provoked by extremists are almost daily occurrences. Particularly alarming is the situation on the border states of Punjab, Jammu and Kashmir. In the north-west of India and in Assam and Manipur in the north-east there has been an obvious upsurge in the activities of extremist groupings who have found refuge outside India, mostly in Pakistan, Britain and Canada, as well as in the United States.

The Indian Government is taking political and defence measures to protect the country's unity. In Delhi, Prime Minister Indira Gandhi and her Cabinet Ministers have met with leaders of the opposition parties. After discussing the situation in Punjab, it was decided to start a new round of talks with the participation of opposition parties to settle the conflicts and controversies in this state where a few months ago presidential rule was introduced.

THE PENTAGON'S SHADOW OVER PORTUGAL

In January two events coincided, says V. Kolchik writing in the newspaper SOVIETSKAYA ROSSIA, who recently visited Portugal. "The Nathan Hale", the American nuclear submarine entered the port of Lisbon where it is to be moved. And in Washington, talks were held between the Deputy Prime Minister and Defence Minister of Portugal Carlos Moia Pinto and the US Defence Secretary, Caspar W. Weinberger. They discussed the purchase of American fighters and bombers for the Portuguese air force.

The coincidence is, of course, accidental. However, what is not is the link between the freedom which American military of all ranks feel in Portugal and the state of relations between the two countries. Increasingly close cooperation in the military sphere lies in the forefront of these relations. The road to this cooperation has been opened up by right-of-centre governments which have been in office since 1980. The present coalition government of the socialist and social-democratic parties is no less enthusiastic about expressing sentiments of loyalty towards the United States. The members of the coalition are even speaking about granting "new concessions" to Washington and NATO. These relate, first and foremost, to the expansion of the American military presence in Portugal.



VIEWPOINT

Nikolai ZABORIN

Lebanon: the USA goes—or does it?

The "phased redeployment" of Marines from Beirut onto Sixth Fleet ships decided on by President Reagan looks like an American pull-out, but things are not that simple. The move has evidently a dual purpose whose achievement, the administration believes, would give it the best of both worlds.

The first and main goal is to dampen the passions aroused by the direct presence in Lebanon of American combat units moved there 18 months ago as part of the "multinational peace-keeping force". The myth of the "peace-keeping" nature of their mission was quickly dispelled — the Marines emerging as the de facto new occupiers of the country, their main function being to consolidate US military presence in Lebanon and to provide a pretext for a massive American naval build-up in the eastern Mediterranean. In the final analysis it appears that such policies cut both ways: the mounting American aggressiveness and escalating tensions have resulted in growing denunciation of American policy around the globe, in both the Arab world and in the United States itself. Lebanon has in some measure hamstrung Reagan, who is now seeking re-election. By redeploying the Marines under the unproved protection of its

ships and thus making them less vulnerable, the White House is also making itself less vulnerable to criticism. Reagan is getting rid of an acute foreign policy problem in the election battles, noted an American TV network correspondent.

The second goal is to "retreat" from Lebanon in such a way so as to stay on there. The Pentagon's wish to preserve a foothold in the country is understandable, for Lebanon has turned into another extremely valuable American beachhead right in the very heart of the Middle East, which precisely explains the "phased" nature of the evacuation. The Reagan administration obviously wants to ride out the storm — after some bitter fighting West Beirut has come under the control of the Lebanese patriotic forces, the Lebanese army is now divided, as many Shi'ite Muslims have joined the opposition, and the presidential power, which Washington is banking upon, has become substantially undermined.

So where is the "turnabout" in American policy in Lebanon which is being made so much of in Washington? It in fact boils down to nothing but a set of plays and changed strategies while Washington's general strategy remains unchanged. Doubtless, this "turnabout"

was forced on the administration by circumstances. But a lost skirmish, the White House believes, by no means signifies a lost battle. Having regrouped its forces, Washington is planning revenge. It intends to use bombs and shells to avenge the "humiliation" it suffered in Lebanon, to win back, as far as is possible, its slipping military and political grip, and provided all goes well, to make short shrift of those elements hindering the fulfilment of its expansionist desires. In particular the national patriotic forces of Lebanon and Syria.

Evidence of this is shown by Reagan's decision, announced simultaneously with that on the redeployment of Marines, empowering the American command in Beirut to launch, without prior consultation with the Pentagon, combined attacks by carrier aircraft and naval guns against the positions of Lebanese patriots and the Syrian contingent in Lebanon.

Large-scale aggressive incursions may well come from a different direction, namely Israel, which has been undergoing a series of emergency consultations with Washington regarding "actions" in Lebanon. According to the Israeli "Maariv", the US suggested to Tel Aviv that a concerted combat action be mounted in Lebanon to defend its political in-

terests. Threats have also been issued by Israeli Defence Minister Moshe Arens, who charged that the Israeli army was prepared to react to any change in the Lebanese situation, including the most undesirable changes. It is clear what kind of changes Tel Aviv would be averse to, and equally clear what its reaction might be, taking into account the fact, for instance, that a practice mobilization of reservists, the largest in years, was recently held in Israel.

Finally, the USA and Israel, partners in "strategic cooperation", are hoping that their actions might be supported by some right-wing Christian formations, including from among the Lebanese army, which the Pentagon is planning to urgently rearm and strengthen.

The drama in Lebanon continues, with half of the country lying in ruins and its south occupied by Israel. While the numbers of the "multinational forces" in Lebanon dwindle the threat of atrocious American attacks against Lebanon is increasing. There is a growing possibility of the country being plunged into another civil war, the chief bone of contention being the country's ignominious "peace agreement" with Israel reached under American auspices, with all roads to real peace remaining as before, blocked.

Lebanon is a victim of Washington's expansionist imperial ambitions and of the administration's domestic policy considerations. By resorting to hypocrisy and cynical falsehood (for instance, Reagan has already dubbed as "terrorists" the Lebanese opposition forces fighting for their country's sovereignty and independence against the American-Israeli occupation), the White House continues its "matted-fisted fairy play" down the road of blackmail, benditry and adventurism.

Flight in aid of world's children

Washington. A round-the-world flight in aid of children united at Washington National Airport when a Gulf Stream-3 plane, piloted by the American sports woman-pilot B. Knapp, landed there recently. The aim of the flight sponsored by the UN Children's Fund (UNICEF) was to promote peace and build up contacts especially between children from different nations. Another goal was to collect aid for needy and hungry children all over the world.

The Washington — London — Moscow — Novosibirsk — Peking — Tokyo — Honolulu — Los Angeles — Washington flight was completed in 45 hours 32 minutes and 53 seconds. A record for this class of plane between London and Peking by the American crew were joined by Soviet leader pilots.

Messages of peace and friendship in the form of letters and pictures done by children in different countries were delivered to the cities where the Gulf Stream-3 landed. At each stop, members of the flight were met by children who passed on letters to their peers abroad.

B. Knapp remembers very well the warm welcome they received at Novosibirsk airport where Soviet schoolchildren met her with flowers and gave her many colourful pictures, one of which says: "No to Nuclear Weapons".

This alone made our flight worthwhile, said Knapp at the end of the journey. We have become convinced that we all need peace, she stressed.

HOME NEWS

Round the Soviet Union

● **NEW SNOW LEOPARD HABITATS** HAVE BEEN DISCOVERED BY KIRGHIZ GAME-WARDENS IN CENTRAL ASIA. These powerful cats are "in control" of large areas in the upper parts of the Kungai and Terkel-Ale-Too mountain ridges. Thanks to protective measures, the number of goats and other animals living high up in the mountains, has also increased.

● **A NEW STAGE** HAS BEGUN IN THE DEVELOPMENT OF THE BALTIC SEA RESOURCES. Oilmen from Kaliningrad have started drilling the first prospecting well on the coastal shelf. Its projected depth is about 3,000 metres.

● **REAGENTS** HAVE BEEN OBTAINED BY SCIENTISTS AT THE UNIVERSITY OF LATVIA MAKING IT POSSIBLE TO DETECT EVEN THE SMALLEST AMOUNTS OF 30 CHEMICAL ELEMENTS IN WATER. The new chemicals can identify any of the elements even if the concentration in solution does not exceed a tenth of a thousandth of a per cent. One important field where the reagents will be of use is in quality control of sea and sweet water.

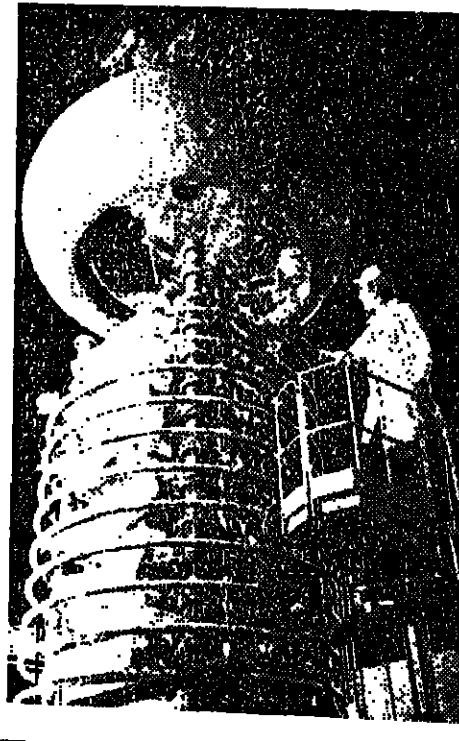
● **EXPERTS IN FOREST PROTECTION** HAVE BEGUN SURVEYING MOUNTAIN AREAS IN THE CENTRAL CAUCASUS. They are studying parts of reserves which are hard of access from helicopters. First reports coming in from hunting farms in the area are spending the winter in favourable conditions. Compared with last year, there have been considerable increases in the numbers of Caucasian goats, roe deer, boars and squirrels.

Computer-controlled Irrigation

A computer has been put in control of a major irrigation system supplying water to one hundred thousand hectares in the Fergana Valley, in Uzbekistan. With the help of automatic and remote-control devices, the computer runs pumping stations, hydroschemes and canals.

POWER FOR THE FUTURE

For billions of years the Sun has been lavishing its warmth on the Earth. From time immemorial people have been drawn to this inexhaustible source of energy. Now it seems they might have uncovered its secret, enabling them to light a sun of their own on Earth. So far, this energy exists in the shape of the hydrogen bomb. What causes its explosion has been described as uncontrolled thermonuclear fusion. With this reaction, atoms of hydrogen combine, releasing a huge amount of heat. The question is, can this process be controlled? Today, research on the subject of controlled thermonuclear fusion, which began thirty years ago in the Soviet Union, the United States and Britain, is going on in many scientific centres of the world.



In order to make this self-sustained reaction a reality, a number of conditions must be fulfilled. The two most important of these are to obtain and maintain for a period of time a temperature of nearly a hundred million degrees and a compact cluster of hydrogen nuclei. No material known on earth can withstand such temperatures. In order to achieve these results, scientists have taken several directions. The first is associated with the word Tokamak, which has found a permanent place in international scientific language. It is an acronym made up of the first syllables of the Russian terms for the main components of the thermonuclear installation designed in the Soviet Union — a toroidal magnetic field chamber. In the future, Tokamaks can be used for producing and maintaining high-temperature plasma. It has been recognized by scientists in a number of countries that in these installations, conditions can be obtained to sustain a controlled thermonuclear reaction. There are 70 such installations in the world now. There is even a project for the building of an international reactor, the INTOR Tokamak.

At the same time, scientists are looking for other ways to sustain thermonuclear fusion. They are testing the so-called impulse systems in which the reaction will consist of a series of thermonuclear fuel microexplosions rather than being sustained continuously. This fuel is a mixture of deuterium and tritium. There is a lot of deuterium in ordinary water, and tritium can be obtained from lithium, whose stocks will last for hundreds of years. Attempts are being made to heat this mixture to a temperature of nearly one hundred million degrees Centigrade by means of an electron beam laser. Both these directions are being developed in the Soviet Union.

In the photograph, taken at the Institute of Nuclear Physics which is part of the Siberian Department of the USSR Academy of Sciences, you see an installation for heating plasma, a generator in which for several millions of a second, an electron beam is generated with a power which is tens of times higher than the entire Krasnoyarskaya Hydroelectric Power Station, the biggest in the USSR.

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Proceeding from stored information on agricultural land and water resources, as well as from real-time data derived from outlying control stations the computer determines the optimum irrigation regimen. Each field receives as much water as it needs. The computer takes mere seconds to evaluate an emergency situation and switch off the right part of the automatic control system.

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The platforms will help considerably expand the oil prospecting and production areas in the Caspian Sea. Every stationary platform will make it possible to drill twelve boreholes simultaneously at depths of up to 200 metres.

Two-thirds of the oil extracted in Azerbaijan SSR comes from the Caspian Sea.

NEW TRUCK FOR THE NORTH

Frosts of -60°C are no hindrance to the new MAZ heavy-duty trucks, now being produced in Ryklovskaya.

The first batch of trucks, which have been specially designed for work in the Arctic, has been sent to the northern parts of the country. Each one has a complex of effective heating system. Its designers have utilized the exhaust fumes of the engine. This way the fuel tanks are heated and moist cargo is protected from freezing. The sides of the body, the door, the cabin is also heated. In addition, the cabin has an automatic electric heater which is activated in any emergency stopping of the engine. As the machine's metal structure and the tyres are made of highly durable frost-resistant materials.

The new truck is the prototype for a whole series of trucks. As well as a 40-tonne tractor, a 20-tonne dump truck with a good cross-country capability, an 18-tonne pipe carrier and other special vehicles for transporting large size construction structures will be made.

Road made of synthetic material

Dornite, produced at the Leningrad factory of non-metallic materials, helps speed up the construction of roads at those most impassable and boggy places. It makes it possible to build straight roads on waterlogged marsh soil without resorting to the traditional excavation. The material is spread as a thin layer on which sand and broken stones are poured and asphalt is laid. The thin layer which withstands heavy loads drains moisture well.

Until now dornite was used in an experiment only for laying roads in Western Siberia. The growth of the production of this material the geography of its deliveries will expand considerably. The first consignments of the product, which is in short supply as yet, have been dispatched to the Non-Black Sea Zone of Russia for building roads in agricultural areas.

reform by writing textbooks based on these principles. In order to write such textbooks as quickly as possible it is necessary to invite not only the recognized scholars, but also the young experts in psychology, age-group psycho-neurology, and physiology. Both children and their teachers will acquire this new educational side by side.

Professor S. Dolitsky, Corresponding Member of the USSR Academy of Medical Sciences, in the newspaper "Izvestia".

STARTING SCHOOL AT SIX

What has started to worry society is the immature attitude prevalent among school-leavers. Leaving school at seventeen or eighteen, young people have such vague ideas about employment that their final choice is often remote both from the needs of society and from their own abilities. It is unacceptable to be at school until eighteen. It will only encourage irresponsibility and dependence if we keep people at school at ages as if they were still children. Can a year be "borrowed" from the pre-school period? It is urgent to answer this question without a substantial amount of experimentation. Experiments to start school at six have been confirmed for almost two decades in the most constituent republics of this country and in the most diverse regions. The outcome pointed in only one direction: the cognitive and creative capacity of a six-year-old is such that any delay in systematic education means an artificial delay in development. This conclusion has been incorporated into the present-day school reform.

A. Khripikova, Vice-President of the Academy of Pedagogical Sciences, in the "Sotsialisticheskaya Industriya" newspaper.

WHAT SHOULD BE TAUGHT?

Here is another important problem: just what should be taught in school? Without noticing it, we have become inordinately enthusiastic about higher mathematics, and the creation of new and various theories. But how can it be otherwise? We are surrounded by electronics, automatic machines, and computers which cannot and should not lag behind. That is why we are trying to keep pace with all these new developments. On the way, we are losing sight of the most important thing — the development of the child's mind.

M. Komleva, Director, School No. 199, Moscow, writing in the newspaper "Moskovskaya Pravda".

ANTICIPATING THE NEW CONDITIONS

The most important task is to bring up and educate children with "the fullest account" taken of the social conditions in which they are to live and work. Consequently it is stipulated that the teaching process will expedient thing is to begin the implementation of the

HOME NEWS

Places to visit

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Kolomenskoye owes its rebirth to Soviet restorers. Early this century the ensemble was in ruins, with some of its buildings being used as stables.

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At present, the exhibits preserved at Kolomenskoye are objects of architectural applied arts, such as a clock tower made four centuries ago, wrought iron grills, coloured tiles, plaques, wooden carvings, icons depicting ancient Russian architectural monuments, providing the only existing information that has come down to us about them. A few years ago, valuable 16th-17th centuries wooden structures were brought here from different parts of the country.

KOLOMENSKOYE



NEW HOME FOR KREMLIN EXHIBITS

Unique exhibits from the collections of the Kremlin museums in Moscow have been moved to the "Soviet Culture" pavilion at the USSR Exhibition of Economic Achievements, where they are attracting many visitors. Among the items on view are a carved gun decorated with silverwork made in 1716 in the Siberian town of Tobolsk, an 18th-century pistol made in Tula and a bronze and malachite clock made in the city of St. Petersburg in the past century, plus numerous documents and photographs.

The "resettlement" of these objects is due to the temporary closure of the world-famous Armoury, the oldest museum in the Kremlin, which is now being restored. A new display is being mounted there, and the lighting of the existing rooms is being improved.

ISLANDS OF GREEN GIANTS

The Rastoki grove in the Carpathians is the only place in the Soviet Union where Douglas fir grows. Its original homeland is North America. The first grove was planted there in 1908. These will soon be 80 years old and many of them, having grown as high as 50 metres with a 50 cm diameter, are already producing seeds.

According to dendrologists these trees are now in their prime. It is interesting to note that beech and pine — natives of the Carpathians, planted at the same time as the Douglas firs, have grown only 20 metres high and suffer from winds and pests. The secret of the vitality of the Douglas fir is its immunity to disease and its strong root system. It is two-three times more productive than traditional Carpathian plants. Besides, its beautiful texture and durable timber make it indispensable in furniture production and building construction. At present, thanks to the efforts of wood growers the valuable tree covers more than 1,000 hectares in the Carpathian region.

DOWN OUR DEEPEST CAVE

An expedition of speleologists from Moscow has started its descent into the Snezhnaya Cave, believed to be the deepest in the Soviet Union, and the third deepest in the world. But speleologist Alexander Morozov, who heads the expedition, thinks that the cave may be much deeper than is generally thought and that there may be a tunnel, so far undetected, linking it to the cave.

This hypothesis was partly confirmed in November of last year, when climbing over debris in one of the halls of the cave, athletes from Leningrad discovered stone carvings left behind by a group of speleologists in the winter of 1930. This could well mean that both the underground mazes form part of a single system, and the purpose of the present expedition is to establish whether this is indeed the case.

The speleologists have divided into two groups, one going down the Mezheny Cave and the other the Snezhnaya, with the hope that they could meet up 600 metres underground. Should this meeting take place, a major geographical discovery will have been made. The expedition is to last six weeks.

A station for international space communications has begun operating in the Black Sea port of Odessa. The satellites used to ensure the communications are part of the INMARSAT and guarantee reliable links with any part of the World.

Airplanes and birds

Airplanes and birds could be neighbours, rather than rivals in the sky, once migration routes are well studied. One such study has been undertaken by ornithologists at the Institute of Zoology and Parasitology of the Academy of Sciences of the Tajik SSR, who have mapped the migration routes of birds that nest in that republic. The results of their work turned out to be quite unexpected. It appeared that in mountainous areas migration routes mainly coincide with the local airline routes running above river valleys. As airlines become faster, so the danger of collisions grows. Precise data on migration routes should help reduce risk.

Ocean. The short-wave transmitters which were used before caused ships sailing at long distances from shore to have their communications cut off for several days owing to the atmospheric interferences.

OF INTEREST

Three rare items have recently been added to the Vladimir-Suzdal preserve museum. They include an iron-clad chess and an earthenware pitcher both containing 16th-17th-century coins. The third item — a hoard of coins discovered during archaeological excavations in Vladimir, is the most interesting. Ten out of the 30 50-hopek silver coins minted in 1021-30 that were found were marked with the initials "T.R."

Numismatists believe that they stand for Thomas Rase, chief of the Royal Mint in London. As the coins were minted in London by contract with the USSR Government.

Science and technology

LAKE BAIKAL SETS THE STANDARD

The Barguzinsky Reserve station, opened on Lake Baikal, is very sensitive to changes in the biosphere over a vast region. It is one of many hundreds of climatic stations and posts operating in Siberia. Its task is to monitor any changes taking place in the environment under the impact of economic activity.

It was not by chance that Baikal was chosen as the site for a biospheric station. Following scientists' recommendations no industrial projects are being built on its shores. The rafting of timber on these rivers flowing into the lake has been stopped and the standards for the disposal of waste water have been toughened. The eastern shore of the lake, the most distant from industrial areas, big cities and settlements makes it possible to regard it as a standard for the natural environment. This is where the Barguzinsky Reserve is situated. Stable is the main object for protection in the reserve.

HOW MUCH IS THE AIR?

Can one calculate how much the air is worth? Scientists at the Leningrad Academy of Wood Technology took up this issue under the leadership of Professor S. Belov.

The method of estimates they suggest lies in the fact that the usefulness of forests is assessed by the expenditure needed to recreate components of the forest environment artificially. Forests are artificially oxygen on this planet: just one hectare of greenery yields an average three tonnes of oxygen a year. One needs to spend 600 roubles to get the same amount artificially.

In most forests, particularly pine and juniper ones, the air is practically sterile thanks to phytoncides — volatile substances emitted by plants. The leaves of oak and poplar kill the dysentery bacillus, pine kills the tuberculosis bacillus. Plant poisons are effective within a range of ten metres. Over a summer period one hectare of pine groves produces ten kilos of phytoncides which cost 300 roubles. Aerofit, a special installation for their production will cost exactly that much.

HOUSES OF SAWDUST

A monolithic block that only takes one man to lift. It can be sawn into parts by a normal hand saw, and a nail can be driven into it with one blow of the hammer. It does not burn. Such are the properties of aerobolt, a construction material used to build cottages.

In fact, aerobolt is a form of sawdust. It is made as follows. Timber waste and cement, plus calcium chloride and technical soap are put into a concrete mixer, churned into a uniform mass and then poured into moulds. The parts for the construction of a house will be ready in 25 days. Since cement is sometimes in short supply, research staff at the department of structural parts at the Vladimir Polytechnic suggest the use of gypsum and Portland cement as binders. The first house made of aerobolt has stood up well to all tests. It stayed warm and dry even when the temperature outside was -45°C and when the corners of some cottages made of time and sand brick froze solid.

VIEWPOINT

RE-EQUIPPING SOVIET AGRICULTURE

Vasily CHERNOV, Deputy USSR Minister of Tractor and Agricultural Machinery

By 1990, the Soviet Union will have completely re-equipped the agricultural industry with highly efficient machinery. Today, this country is producing as much machinery for this purpose as the United States, Britain, France and West Germany taken together. Last year's harvest saw about three million tractors and nearly 700 thousand combine harvesters being put to use.

An up-date of farming technology and mechanization of farming itself constitutes one of the main levers with which the rates of growth in agricultural output is to be raised over the next few years in this country. The Soviet Union has completely mechanized such operations as ploughing, sowing of grains, cotton and sugar beet, and the harvesting of grain. In the near future, we shall completely mechanize the planting of potatoes, inter-row cultivation of crops, the cleaning of grain, the harvesting of maize grain, and a number of other operations. Yet, there are still some types of work which must be mechanized and adapted for the total introduction of industrial technology. For this purpose, some 600 completely new and modernized models of machines are to be designed. In order to speed up the manufacture of these new machines we are going to carry out the complete reconstruction and technical retooling of 147 factories with tens of thousands of numerically controlled machine tools, hundreds of automatic transfer lines, and automatic transfer lines. As a result, the rates at which new technology is designed will double.

Let us look at some examples of the new technology. One of these is the new generation of grain harvesters of the Don series whose mass production is to start in 1988. Tests are being carried out on a grain harvester of a new type with a rotor transfer with a productivity rating twice that of existing machines. By 1990, the country-side will receive new powerful tractors whose average productivity is 1.7 times higher.

On the whole by this time, the fleet of machines which will ensure the introduction of industrial technology in farming, will increase almost 2.5 times, and the number of machines and appliances used to preparation, compounding and application of fertilizers to the soil — more than fivefold.

What is the expected effect from the introduction of this new technology in agriculture? Following the renovation of the fleet of grain harvesters, the harvesting time in 1985 will be reduced to an average two and a half weeks, and in 1990 to 11-12 days. This will considerably reduce grain losses. The productivity of the sowing machines will increase by 15-30 per cent, while the amount of labour they require will go down by one-third to one-half. Improved grain cleaning machines will reduce spending on the processing of grain to one-seventh and even to one-tenth as compared with the existing equipment.

By 1990, it is planned to complete the comprehensive mechanization of agriculture in this country on a new technical basis. There will be particularly large increases in the variety of technical means for the protection of the soil. At the same time, the number of people engaged in agricultural production will drop.

Round the Soviet Union

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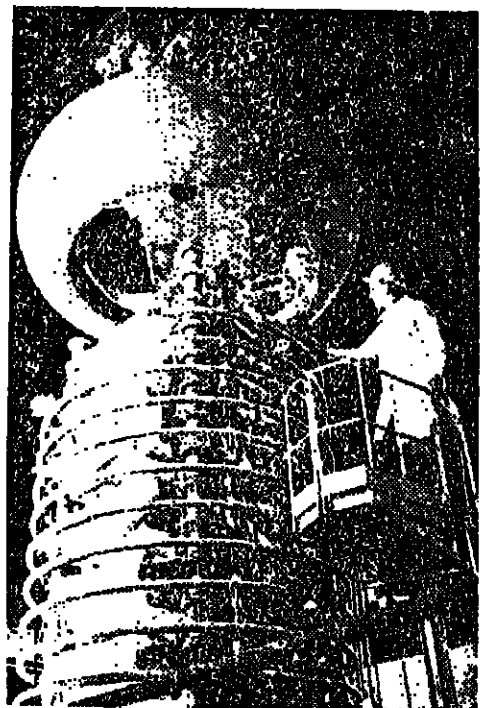
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In order to make this self-sustained reaction a reality, a number of conditions must be fulfilled. The two most important of these are to obtain and maintain for a period of time a temperature of nearly a hundred million degrees and a compact cluster of hydrogen nuclei. No material known on earth can withstand such temperatures. In order to achieve these results, scientists have taken several directions. The first is associated with the word Tokamak, which has found a permanent place in international scientific language. It is an acronym made up of the first syllables of the Russian terms for the main components of the thermonuclear installation designed in the Soviet Union — a toroidal magnetic field chamber. In the future, Tokamaks can be used for producing and maintaining high-temperature plasma. It has been recognized by scientists in a number of countries that in these installations, conditions can be obtained to sustain a controlled thermonuclear reaction. There are 70 such installations in the world now. There is even a project for the building of an international reactor, the INTOR Tokamak.

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KOLOMENSKOYE



NEW HOME FOR KREMLIN EXHIBITS

Unique exhibits from the collections of the Kremlin museums in Moscow have been moved to the "Soviet Culture" pavilion at the USSR Exhibition of Economic Achievements, where they are attracting many visitors. Among the items on view are a carved gun decorated with all-verwork made in 1716 in the Siberian town of Tobolsk, an 18th-century pistol made in Tula and a bronze and malachite clock made in the city of St. Petersburg in the past century, plus numerous documents and photographs.

The "resettlement" of these objects is due to the temporary closure of the world-famous Arsenal, the oldest museum in the Kremlin, which is now being restored. A new display is being mounted there, and the lighting of the existing rooms is being improved.

ISLANDS OF GREEN GIANTS

The Rastol grove in the Carpathians is the only place in the Soviet Union where Douglas fir grows. Its original homeland is North America. The first grove was planted there in 1906. These will soon be 80 years old and many of them, having grown as high as 50 metres with a 50 cm diameter, are already producing seeds.

According to dendrologists these trees are now in their prime. It is interesting to note that beech and pine — natives of the Carpathians, planted at the same time as the Douglas firs, have grown only 20 metres high and suffer from winds and pests. The secret of the vitality of the Douglas fir is its immunity to disease and its strong root system. It is two-thirds more productive than traditional Carpathian plants. Besides, its beautiful texture and durable timber make it indispensable in furniture production, and building construction. At present, thanks to the efforts of wood growers the valuable tree covers more than 1,000 hectares in the Carpathian region.

DOWN OUR DEEPEST CAVE

An expedition of speleologists from Moscow has started its descent into the Snezhnaya Cave, believed to be the deepest in the Soviet Union, and the third deepest in the world. But speleologist Alexander Morozov, who heads the expedition, thinks that the cave may be much deeper than is generally thought and that there may be a tunnel, so far undetected, linking it to the recently discovered Mezheny Cave.

This hypothesis was partly confirmed in November of last year, when climbing over debris in one of the halls of the cave, athletes from Leningrad dis-

covered stone carvings left behind by a group of speleologists in the winter of 1930. This could well mean that both the underground mazes form part of a single system, and the purpose of the present expedition is to establish whether this is indeed the case.

The speleologists have divided into two groups, one going down the Mezheny Cave and the other the Snezhnaya, with the hope that they could meet up 600 metres underground. Should this meeting take place, a major geographical discovery will have been made. The expedition is to last six weeks.

RELIABLE OCEAN COMMUNICATIONS

A station for international space communications has begun operating in the Black Sea port of Odessa. The satellites used to ensure the communications are part of the INMARSAT and guarantee reliable links with any part of the World

Ocean. The short-wave transmitters which were used before caused ships sailing at long distances from shore to have their communications cut off for several days owing to the atmospheric interference.

Airplanes and birds

Airplanes and birds could be neighbours, rather than rivals in the sky, once migration routes are well studied. One such study has been undertaken by ornithologists at the Institute of Zoology and Parasitology of the Academy of Sciences of the Tajik SSR, who have mapped the migration routes of birds that nest in that republic.

The results of their work turned out to be quite unexpected: it appeared that in mountainous areas migration routes mainly coincide with the local airline routes running above river valleys.

As airlines become faster, so the danger of collisions grows. Precise data on migration routes should help reduce risk.

OF INTEREST

Hidden treasure

Three rare items have recently been added to the Vladimir-Suzdal preserve museum. They include an iron-clad chest and an earthenware pitcher both containing 16th-17th-century coins. The third item — a hoard of coins discovered during earthmoving operations in Vladimir, is the most interesting. Ten out of the 30 50-kopek silver coins minted in 1521-25 that were found were marked with the initials "T.R."

Namiatkists believe that they belong to Thomas Rose, chief of the "Royal Mint" in London. As opposites of the Leningrad mint were founded in 1924, some silver coins were minted in London by contract with the USSR Government.

Science and technology

LAKE BAIKAL SETS THE STANDARD

The Baikal Reserve station, opened on Lake Baikal, is very sensitive to changes in the biosphere over a vast region. It is one of many hundreds of climatic stations and posts operating in Siberia. Its task is to monitor any changes taking place in the environment under the impact of economic activity.

It was not by chance that Baikal was chosen as the site for a biospheric station. Following scientists' recommendations no industrial projects are being built on its shores, the rafting of timber on these rivers flowing into the lake has been stopped and the slinklands for the disposal of waste waters have been toughened. The eastern shore of the lake, the most distant from industrial centres, big cities and settlements, is a standard for the natural environment. This is where the Baikal Reserve is situated. Sober is the main object for protection in the reserve.

HOW MUCH IS THE AIR?

Can one calculate how much the air is worth? Scientists at the Leningrad Academy of Wood Technology took up this issue under the leadership of Professor S. Belov.

The method of estimates they suggest lies in the fact that the usefulness of forests is assessed by the expenditure needed to recreate components of the forest environment artificially.

Forests are the supplier of oxygen on this planet: just one hectare of greenery yields an average three tonnes of oxygen a year. One needs to spend 690 roubles to get the same amount artificially.

In most forests, particularly pine and juniper ones, the air is practically sterile thanks to phytoncides — volatile substances emitted by plants. The leaves of oak and poplar kill the dysentery bacillus, pine — tuberculosis, and the fir bark kills the diphtheria bacillus. Plant poisons are effective within a range of ten metres. Over a summer period one hectare of pine groves produces ten kilos of phytoncides which cost 300 roubles. Aerofit, a special installation for their production will cost exactly that much.

HOUSES OF SAWDUST

A monolithic block that only takes one man to lift, it can be sawn into parts by a normal hand saw, and a nail can be driven into it with one blow of the hammer. It does not burn. Such are the properties of arbolit, a construction material used to build cottages.

In fact, arbolit is a form of sawdust. It is made as follows. Timber waste and cement, plus calcium chloride and technical soap are put into a concrete mixer, churned into a uniform mass and then poured into moulds.

The parts for the construction of a house will be ready in 25 days. Since cement is sometimes in short supply, research staff at the department of structural parts at the Vladimir Polytechnic suggest the use of gypsum and Portland cement as binders.

The first house made of arbolit has stood up well to dry tests. It stayed warm and dry even when the temperature outside was -45°C and when the corners of some cottages made of lime and sand brick froze solid.

VIEWPOINT

RE-EQUIPPING SOVIET AGRICULTURE

Vasily CHERNOV, Deputy USSR Minister of Tractor and Agricultural Machinery

By 1990, the Soviet Union will have completely re-equipped the agricultural industry with highly efficient machinery. Today, this country is producing as much machinery for this purpose as the United States, Britain, France and West Germany taken together. Last year's harvest saw about three million tractors and nearly 700 thousand combine harvesters being put to use.

An up-date of farming technology and mechanization of farming itself constitutes one of the main levers with which the rates of growth in agricultural output is to be raised over the next few years in this country.

The Soviet Union has completely mechanized such operations as ploughing, sowing of grains, cotton and sugar beet, and the harvesting of grain. In the near future, we shall completely mechanize the planting of potatoes, the cleaning of grain, the harvesting of maize grain, and a number of other operations. Yet, there are still some types of work which must be mechanized and adapted for the total introduction of industrial technology. For this purpose, some 600 completely new and modernized models of machines are to be designed, in order to speed up the manufacture of these new machines we are going to carry out the complete reconstruction and technical retooling of 147 factories, and build 19 new factories with tens of thousands of numerically controlled machine tools, hundreds of machining centres, and automatic transfer lines. As a result, the rates at which new technology is designed will double.

Let us look at some examples of the new technology. One of these is the new generation of grain harvesters of the Don series whose mass production is to start in 1985. Tests are being carried out on a grain harvester of a new type with a rotor transfer with a productivity rating twice that of existing machines. By 1990, the countryside will receive new powerful tractors whose average productivity is 1.7 times higher.

On the whole by this time, the fleet of machines which will ensure the introduction of industrial technology in farming, will increase almost 2.5 times, and the number of machines and appliances used in preparation, commanding and application of fertilizers to the soil — more than fivefold.

What is the expected effect from the introduction of this new technology in agriculture? Following the renovation of the fleet of grain harvesters, the harvesting time in 1985 will be reduced to an average two and a half weeks, and in 1989 to 11-12 days. This will considerably reduce grain losses. The productivity of the sowing machines will increase by 15-30 per cent, while the amount of labour they require will go down by one-third to one half. Improved grain cleaning machines will reduce spending on the processing of grain to one-seventh and even to one-ninth as compared with the existing equipment.

By 1990, it is planned to complete the comprehensive mechanization of agriculture in this country on a new technical basis. There will be particularly large increases in the variety of technical means for the protection of the soil. At the same time, the number of people engaged in agricultural production will drop.

FROM THE SOVIET PRESS

ON THE EVE OF THE SCHOOL REFORM

"The Main Guidelines for a Reform of the General Education and Vocational Schools" — this is the name of a draft reform proposed by the CPSU Central Committee which, in January, was submitted for nation-wide discussion for a period of two to three months. Today, we publish some of the responses to the proposed bill from the national press.

NEW STRUCTURE

An essentially new school structure has been submitted for nation-wide discussion. It consists of three levels — the primary school with grades from the first to the fourth, the junior high school with grades five to nine, and the senior high school with grades ten and eleven grades. Two radical measures deserve approval — a one-year increase in the length of education in primary school and the removal of excessively complex material from curricula and textbooks at all stages in the education.

M. Tsenlapper, Candidate of Pedagogical Sciences, writing to "Pravda".

SCHOOL AND OCCUPATION

What is lacking in the school system today? What is not satisfactory in the way it functions? The provisions of the draft school reform give a clear answer to all such questions. In short, the present type of education lacks a work-oriented and practical direction which means

secondary schools should not only accumulate and absorb knowledge, but should also be able to apply this knowledge. The draft makes room for a transition to universal vocational training which must be provided by secondary schools. In order to achieve this, schools must have all the necessary means available, as should vocational schools, and secondary specialized educational establishments. The transition of the draft reform into practice will mean an end to the situation prevalent today when more than one-third of the young people start life on their own without any useful training for jobs.

Professor P. Filippov, D.Sc. (Philosophy) writing in the newspaper "Sovetskaya Rossiya".

WHAT SHOULD BE TAUGHT?

Here is another important problem: just what should be taught in school? Without noticing it, we have become intimately enthusiastic about higher mathematics, and the creation of new and various theories. But how can it be otherwise? We are surrounded by electronics, automatic machines, and computers which are becoming more and more sophisticated. The school cannot and should not lag behind. That is why we are trying to keep pace with all these new developments. On the way, we are losing sight of the most important thing — the development of the child's mind.

M. Komleva, Director, School No. 199, Moscow, writing in the newspaper "Moskovskaya Pravda".

ANTICIPATING THE NEW CONDITIONS

The most important task is to bring up and educate children with "the fullest account" taken of the social conditions in which they are to live and work. Consequently it is stipulated that the teaching process will anticipate these new conditions. Obviously the most expedient thing is to begin the implementation of the

reform by writing textbooks based on these principles. In order to write such textbooks as quickly as possible it is necessary to invite not only the recognized scholars, but also the young experts who can base their efforts on modern achievements in psychology, age-group psycho-neurology, and physiology. Both children and their teachers will acquire this new education side by side.

Professor S. Doletsky, Corresponding Member of the USSR Academy of Medical Sciences, in the newspaper "Izvestia".

STARTING SCHOOL AT SIX

What has started to worry society is the immature attitude prevalent among school-leavers. Leaving school at seventeen or eighteen, young people have such vague ideas about employment that their final choice is often remote from the needs of society and from their own abilities. I believe it is unacceptable to be at school until eighteen. It will only encourage irresponsibility and dependence if we keep people at school at eighteen as if they were still children. Can a year be "borrowed" from the pre-school period? It is unreal to answer this question without a substantial amount of experimentation. Experiments to start school at six have been continued for almost two decades in all the constituent republics of this country and in the most diverse regions. The outcome pointed in only one direction — the cognitive and creative capacity of a six-year-old is such that any delay in systematic education means an artificial delay in development. This conclusion has been incorporated into the present draft school reform.

A. Khripkova, Vice-President of the Academy of Pedagogical Sciences, in the "Sotsialisticheskaya Industriya" newspaper.

ENTERTAINMENT

Theatre, Cinema and TV Stars



VYACHESLAV POLUNIN

In life, this nice-looking young man is very sociable and talkative, but when on stage he utters not one word throughout the performance. For Vyacheslav Polunin, an actor with Lenkonis (a show biz organization) better known as mime and clown Aslyal, makes himself understood through the language of gestures. And seeking for an image of his own in the art of mime is the "Lisadel" pantomime theatre-studio which he founded.

Vyacheslav became seriously bitten by pantomime as a schoolboy, after he had gone to a concert given by the French mime, Marcel Marceau. Behind the theatre-studio life years of study at the N. K. Krupskaya Institute of Culture, then a period with the Lenkonis art studio and later with the "Experiment" youth theatre where two pantomimes, "Lisadel" and "Dreamers" were born.

Drawing on traditional folk sources Polunin tries to combine pantomime with clowning. He thinks up the plots for his pantomimes himself in which the keen insight of an artist is fused with good-natured humour and sometimes with a melancholy note of sadness and compassion.

The theatre-studio is a perfect "testing range" for creative search, Polunin says.

Here we stage experimental plays, seeking for a road of our own in the plastic arts. Today's amateur is tomorrow's professional.

Q: What do you think is the most important thing in mime?

A: Sincerity. The ability to improvise. In our attempts to combine pantomime with clowning we want to engage our audience in conversation on subjects of universal interest. Anyone subject to constant haranguing on moral themes, simply stops listening. Laughter and sincerity have always been a splendid way of maintaining a conversation with spectators.

Q: Since you mention conversation, don't you sometimes feel like breaking out into speech?

A: Why? Remember the popular saying — silence is golden. As long as an actor has a perfect mastery of mime he can use it to express everything he is feeling deep down. Words become superfluous.

All our productions — for instance, "Dreamers" and "Petruška" — the latter is staged by Oleg Kiselyov of Moscow — are very different, Polunin continues. In each play we are trying to interpret, in our own terms, yet another aspect of pantomime. And since the new very often consists of the old rescued from oblivion, at the "Lisadel" we study the traditions of the Russian skomorokhi jesters and the Italian commedia dell'arte.

The individual numbers, our productions, and, indeed, the whole theatre-studio is an experiment. Professionals and members of the ensemble work side by side with amateur performers in concerts given by the amateur ensemble. In March, the "Lisadel" theatre-studio will go to Budapest where it will take part in the International Pantomime Festival.

NEW DANCING DUET

Ballet soloists Lyudmila Semenyaka and Andris Liepa (in the photo) appeared together for the first time in a concert number in the Kremlin Palace of Congresses and on the stage of the Bolshoi. Semenyaka dances many of the leading roles in the

Bolshoi's ballets. Liepa, who is the winner of the Fourth International Ballet Dancers Competition in Moscow, was recently accepted by the famous company. Lovers of ballet will soon be regaled with new pieces danced by this talented pair.

You are my delight

Before long, cinemas in this country will be showing a new musical, "You Are My Delight, My Torment" about life at a modern opera house. Made by Mosfilm Studios, the film represents the screen debut of Vladimir Plavko, a leading tenor from the Bolshoi Theatre in Moscow. Not only does Plavko act in the film, he also helped to write the script and to produce it.

It will make no sense if I tell you the plot, says Plavko. I will only say that it features music from "Tosca", "The Queen of Spades" and "Carmen". Many singers and musicians from the Bolshoi act themselves. Irina Skobtsova, a very versatile actress, plays the part of a famous singer.

The name of the film, "You Are My Delight, My Torment" is a phrase from the famous aria of Jose which for us symbolizes the attitude of the characters in the film to their profession and to each other. It also symbolizes my personal attitude to the cinema.

Andrei Voznesensky in three volumes

A three-volume edition of collected works by Andrei Voznesensky, one of the most popular Soviet poets, is selling like hot cakes. According to the poet, who recently celebrated his 50th birthday, much of the poetry in the third volume is journalistic in character. It represents a kind of diary, said Voznesensky, a response to events that disturb me. The world is in a particularly tense state at present — for all living things will die in the event of nuclear calamity. Intellectuals should do everything they can to stop the nuclear maniacs. I would like to hope for the best, that people will defend their foremost right, the right to live, that the next decades will see the realization of their hopes and aspirations.

FACTS and EVENTS

Festivals. Berlin, capital of the GDR, is the venue for the 14th International Festival of Political Songs, with about 50 performers and ensembles taking part. Zhanna Bichevskaya and the Volga group represent the Soviet Union.

Operas. The Kishinev Opera and Ballet Theatre have premiered the opera "Suflet" by the Byelorussian composer S. Korles. It is based on Bertolt Brecht's play "Mother Courage and Her Children".

Books. Moscow Iktusivno Publishers have put out a comprehensive study "Russian Painting of the 17th Century" by Vera Brusova. It is printed in Milan (Italy).



Chinese books in Moscow

Of great interest to book lovers is the section devoted to literature published in the Chinese People's Republic which has now opened at the Druzhba bookshop in Moscow. The section has been reopened in line with an agreement between book-selling organizations of both countries. A wide choice of works by classics of Marxism-Leninism in Chinese translation and published in China

in recent years as well as books by outstanding Chinese, Soviet and Russian writers — Ba Jin, Xin, Gorky and Tolstoy, are for sale.

Customers show much interest in the albums of reproductions of classical Chinese paintings as well as in the following dictionaries: "Qiyun", "Zhigun Davidian", and "The Russian-Chinese Dictionary".

'THE AFGHAN TRILOGY'

Profound sympathy with the people of Afghanistan and belief in the triumph of the ideals of the April Revolution — these are the things which permeate "The Afghan Trilogy" by the Azerbaijani writer, Alibey Gadzhizade, put out by the Gyandzhik Publishers in Baku. The three novels are "The Lost Bride", "Years Without Afana" and "Endless Separation", written from the writer's personal impressions after living for several years in that neighbouring country. The time of the trilogy is set between the 1950s and December, 1970.

This was the time of struggle against the yoke of despotic rulers and the formation of the People's Democratic Party of

Afghanistan which led the revolutionary movement of the masses, says the writer, in his book and other novels and stories I saw how contradictions grew sharper between power and lack of rights for the people on the one hand, and powers that be on the other hand, how resistance to the monarchy grew.

The writer intends to continue his narration, now devoted to the stages of the Afghan Revolution.

One novel has been staged. The Dzerzhinsky drama theatre in Kirovabad has put on the play "The Lost Bride". Azerbaijani TV is preparing a five-part serial based on the three novels.



The series of illustrations for "Baron Munchausen's Adventures" drama by Yuri Charyshnikov. Lyov has won one of the main prizes — "The Golden Apple" from the International Exhibition of Books for Children (1980) held in the city of Bratislava, Czechoslovakia. Charyshnikov has illustrated books by Leskov, Romanov, and Brecht. A short while ago the Moldavian Literature Artists' Publishers produced a two-volume edition from Anton Chukha using his drawings. In present, the artist is working on "Stories from St. Petersburg" by Nikolai Gogol.

In the photo: illustration to "Baron Munchausen's Adventures".

WHAT'S ON?

February 18-20

THEATRES

Kremlin Palace of Congresses (Kremlin). 18 — A variety concert. 19 (mat) — Bolshoi Theatre performance: Dances, "Coppelia" (ballet); 19 (eve) — Performance by Moscow Classical Ballet Ensemble; Petrov, "The Creation of the World" (ballet); 20 — A concert by the Soviet Army Song and Dance Ensemble.

Bolshoi Theatre (Sverdlov Sq.). 18 (mat) — Molchanov, "The Dawns Here Are Quiet" (opera); 18 (eve) — Tchaikovsky, "Eugene Onegin" (opera); 19 (mat) — Balpal, "The Anger" (ballet); 19 (eve) — Bizet, "Carmen" (opera).

Stanislavsky and Nemirovich-Danchenko Musical Theatre (17 Pushkinskaya St.). 18 — Strauss, "Der Zigeunerbaron" (opera); 19 (mat) — Morozov, "Doctor Doolittle"; 19 (eve) — Gorkhovsky, "Hurricane" (opera); 20 — Prokofiev, "Cinderella" (ballet).

Opera Theatre (8 Pushkinskaya St.). 18 — Gadzhiev, "The Crossroads"; 19 (mat, aft) — Gladkov, "Khottabych"; 19

FILMS

Les Fourberies de Scapin (France). Based on Moliere's comedy of the same name. Cinema: "Zaryadye" (1 Moscow State University), Metro Ploshchad Nogina. Frontline Romance (Odeon Film Studios, USSR). About the heroic tale of the Russian chieftain. Cinema: "Udarnik" (2 Saint-Movicha St., Metro, Bibinets, Imeri Lenina).

CONCERT HALLS

Variety Theatre (20/1 Pushkinskaya St.). 18 — "A Pretty Woman With a Flower and Windows Looking North", featuring Tatyana Dornina. 18, 19 (eve) — "Walk Your Kilometer", a concert, performed by the Suvenir variety dance ensemble and the Dialog pop group. 20 — "Songs Along the

BUSINESS

20 years of productive exchange

The Italian concern SNIA BPD (formerly known as SNIA viscosa) has been cooperating for more than 20 years with the USSR State Committee for Science and Technology.

The latest and most interesting joint work, Francesco Di Raimondo, the firm's area manager, told an MNT correspondent, is to obtain rayon cellulose from leaf-bearing trees.

A batch of cellulose made by the firm from Italian raw materials was successfully tested in the USSR. The next stage is to process Soviet timber in Italy and then return it for tests in the USSR.

The method of obtaining cellulose from leaf-bearing trees, worked out by our firm, Francesco Di Raimondo pointed out, means it is possible to make this process cheaper, earlier expensive coniferous wood was used mainly for this.

SNIA BPD, uniting a number of firms, specializes in the production of chemical fibres, fabrics, non-woven materials, polyester resins and plastics, as well as development projects to prospect for gas and oil. As far as cooperation with the USSR

goes we have already delivered more than 30 complete plants for the production of chemical fibres and raw materials. Units for obtaining kaprolaktam, carbon bisulphide and sulphite cellulose are operating successfully in the Soviet Union. Many deals have been finalized on a compensation basis when as payment for equipment we receive Soviet finished articles.

The firm attaches great importance to participation in international exhibitions arranged in your country. At the exhibition "Stroiekonomika-84", held recently in Moscow, one of our firms, SNIAI, displayed projects for the production of synthetic planks and moulds for the manufacture of reinforced concrete parts. I believe that such meetings of experts considerably strengthen business contacts between the two countries.

I would also like to stress that SNIA BPD was the first Italian firm to sign an agreement with the State Committee for Science and Technology on scientific and technical cooperation. And the experience of past years shows the efficiency of these contacts.

On the basis of agreement

Electrical engineering is one of the rapidly developing fields of scientific-technical and economic cooperation between the GDR and the USSR. It is carried out under intergovernmental multilateral and bilateral agreements, as well as agreements between separate ministries, scientific institutions and enterprises. An MNT correspondent recently met the representatives of two people's integrated plants in the GDR producing electrotechnical goods.

Klaus Holze, Kombinat VEB Elektromotivbau - Elektrotechnische Werke.

Together with our Soviet partners we are now working out a new model of an electric train for mines able to operate at low temperatures (of up to

minus 50 degrees Centigrade). Apart from this experts from our plant and Soviet organizations are developing a system to control electron beam guns used in metallurgy.

We have made and delivered to the USSR more than 1,200 electric locomotives for mines. In 1984, Soviet customers will receive 50 electric EL-50 locomotives and fifty EL-21 locomotives.

Christian Henke, Kombinat VEB Kabelwerk Oberspreewald.

A major problem of the cable industry — how to replace copper with aluminium — is being jointly solved by scientists and engineers at our plant and related Soviet enterprises. We are expecting considerable results from joint work on the development of optical light conductors.

Roads of War and Peace", a concert programme.

Lenin Central Stadium. Palace of Sport (Luzhniki). 18, 19 — Evening with the Moscow Sovremennik Theatre. 20 — "Songs in Luzhniki", a programme, featuring the Buzuki ensemble from Greece and Mikhail Boyarsky, the film, theatre and variety star.

of the 19th individual world championship. February 18, at 6 p.m.; 19, at 2 p.m.

Racing drivers from Sweden, Czechoslovakia and the USSR vie for gold medals.

ATHLETICS

Sports Complex at Krylatokoye (Metro Molodyozhnaya, bus 229). 18 and 19 — USSR winter championship. On 18, at 2 p.m.; on 19, at 11 a.m.

SWIMMING

Olympic Sports Complex (Metro Prospekt Mira). 18 and 19 — USSR winter championship. 10 a.m. and 6 p.m. (both days).

BANDY

Fili Stadium (27 Novozavodskaya St.). 18 and 19 — USSR championship. First league. Moscow Fili vs Leningrad Kravnya Zarya. Noon. (both days).

BASKETBALL

Dynamo Palace of Sport (32 Lavochkina St.). 18 and 19 — USSR men's championship. Top league. 3 p.m., 4.30 p.m. and 6 p.m. (both days).

WEATHER

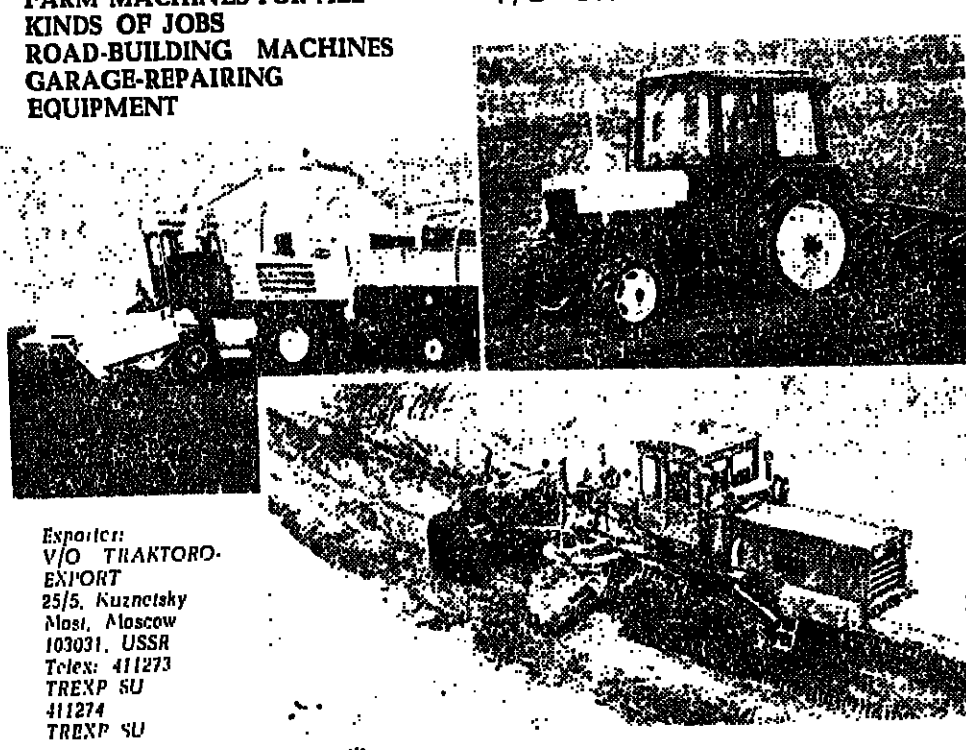
February 18-20

In Moscow, city and region, no snow. Night temperatures of -10°, -13°C and of -10°, -13°C during the day. Weak veering wind.

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Article in an American newspaper

The Washington administration's claims of a "technological lag" in the Soviet Union is a mere propaganda tale. The USSR is a society of highly developed modern technology which, in the future, can only add to its prestige in this area, stresses the

US business community newspaper, "The Journal of Commerce and Commerce".

The Soviet Union is raising its status as a big exporter of technology to Japan, Western Europe and the USA. Over the past decade, the newspaper notes, American corporations bought from socialist countries, chiefly the Soviet Union, over 125 different licences.

Most Americans are ignorant of the fact that the rails of the Washington subway were cast using unique Soviet equipment, while the latest medical devices are based on Soviet patents, said Mr. Kaiser, head of an American foreign trade firm and former consultant to the US Department of State. The newspaper points out.

At the moment, it further notes, the Kaiser Aluminum and Chemical, for instance, gets roughly half its information of breakthroughs in non-ferrous metallurgy from Soviet research publications. The use of Soviet discoveries in nuclear power engineering, laser technology, medicine, metallurgy and other areas is essential for development of advanced technology.

ships to the USSR — the freighter "Astakhan" designed by both countries, and the passenger liner "Leonid Sobolev". This year, the GDR will again supply its partner with industrial electric locomotives for carrying coal and iron ore, and refrigerator cars for carrying fruit, vegetables and other foods.

Q: In 1984 Mongolia will receive from the Soviet Union over 1,300 tractors and combines, hundreds of lorries and other machines for the development of agriculture and livestock-breeding. This is visualized by contracts signed by V/O Avtoexport and Traktorexport with the Mongolian Technological foreign trade organization.

Contacts and contracts

Q: An agreement on trade turnover and payments for 1984 signed in February between the governments of the Soviet Union and the People's Republic of China envisages a substantial expansion in trade between the two countries both as regards volume and the number of items of reciprocally exchanged goods. The total value of bilateral trade this year will amount to about one billion roubles, and increase of 60 per cent on last year.

Q: Under the agreement with V/O Sudimport, the GDR's Schiffskommerz shipbuilders have delivered this year's first

3-millionth tourist from GDR

In 1955, 200 Soviet tourists went to the German Democratic Republic and over 1,700 GDR tourists came to the USSR; in 1984, the GDR is expecting about 100 thousand tourists from the USSR, while 270 thousand East Germans will visit the Soviet Union, MNT was told by Sergei Myshkiewicz, director of the Moscow office of the GDR Travel Bureau. The exchange in tourist groups grows at an annual rate of at least five per cent, with Moscow preparing to welcome its 3-millionth tourist from the GDR later this month.

The Bureau has been operating for the past 25 years. Its management sees its task as consisting in providing GDR citizens with a good, relaxing holiday, rest, at the same time as enabling them to learn some

thing about the Soviet people. The Bureau works in close contact with Intourist, the Union of Soviet Societies for Friendship and Cultural Relations with Foreign Countries, and other organizations. About 150 routes have been prepared for GDR tourists. Tours to Moscow, Leningrad, Kiev, the Baltic republics and the Black Sea coast are particularly popular.

Included on the itineraries worked out by the Bureau are excursions, lectures, and round table meetings with interesting people, such as public figures, scientists, and workers in the arts. In future it is planned to increase the number of tours specially organized for the inhabitants of twinned towns in the two countries. Specialized itineraries for people of the same occupation are becoming increas-

Intourist news

ingly popular. In the USSR, those taking part in such tours are given the opportunity of visiting the enterprises that present most interest to them, of meeting their Soviet colleagues and exchanging experience. Aeroflot and Interflug organize special "friendship plane" flights not only to Moscow and Leningrad but also to Sochi, Tashkent and Tbilisi, among other places.

This year the German Democratic Republic is celebrating the 25th anniversary of its foundation. To mark the occasion, the GDR Travel Bureau is mounting a special exhibition called "GDR — a country of friends", which will be shown in Kishinev, Lvov, Riga and Moscow.

Andrei BADAIX